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MOUNTAIN

LIFE and WORK

Volume VI

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Mountain Life ^A_N_D Work

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MOUNTAIN LIFE AND WORK
BEREA, KENTUCKY

DARK HOLLOW, Virginia, is focusing the attention of the nation upon the problems of the mountains. Some people seem to be realizing for the first time that there are children in isolated sections of this great country who have not had opportunities for an education. It is good that Roy Burraker brought the President a 'possum. However, as the *Washington Evening Star* says very wisely, "Mr Hoover's school will accomplish a great deal of good locally, but its real function will be that of a symbol of the problem."

In the revised list of mountain schools recently published by the Russell Sage Foundation there are 149 private schools listed in our Southern Mountain region supported by 19 different Church Boards and 19 independent agencies. This list does not include the many community and church centers that are carrying on social and religious programs. Some of these schools were started before the Civil War and have been doing a splendid work ever since. Many others have been working for two or three decades.

These facts show that the interest in the mountain welfare is not a recent one. But again quoting from the *Washington Evening Star*:

"Considerable research has been carried out in the past on the human problems of the region.

"But like the educational efforts, it has been patchy.

"There are many model schools in the hollows, from Virginia to Alabama, established by philanthropists, research foundations, and churches. They have done excellent work—in their own immediate neighborhoods. There have been numerous research projects in economics, sociology, psychology, and biology, and the findings have been of inestimable value.

"But, up to the present, little has been done toward the expensive and titanic study of the region as a whole from all the possible avenues of approach, whereby not only a true picture of the entire situation could be obtained, but the interrelation of the historical, economic, biological, psychological, and sociological factors determined."

The projected regional survey will, we hope, give that "true picture of the entire situation" and serve as a fact basis for the evaluation of all mountain work. Those of you who read the account of the New York meeting to consider the survey (*Mountain Life and Work*, January, 1930) will be interested to know that the plans have gone steadily forward. Federal and state forces pledged their support in a meeting in Knoxville in December, and on February twenty-fifth an important meeting was held in Washington to consider a three-year plan of procedure as presented by Dr. L. C. Gray and Mr. C. F. Clayton of the Bureau of Agricultural Economics, Washington, D. C. A new pattern of cooperation has been worked out, and a more unified program is the promise of the future.

KONNAROCK—An Experiment in Education

CATHARINE COX UMBARGER

Konnarock Training School is located at the foot of the two highest peaks in Virginia—Mt. Rogers and White Top. We are fourteen miles across Iron Mountain from the little town of Chilhowie, our nearest point on the Lee Highway and the main line of the Norfolk & Western Railroad. The road across the mountain, a dirt one, is usually in good condition in the summer, but in the winter months, with our heavy snows and rains, this same road is often almost impassable. We have a branch line of the Norfolk & Western Railroad from Abingdon to Konnarock, two miles from our school. The daily train brings our mail, freight, and supplies.

This little village was a lumbering town. Over a year ago the last of the timber was cut, and since then there has been a steady decrease in population. While the lumber was in operation, a large company-store supplied our various needs. This store is now closed, and several small stores have been opened, carrying a very limited supply of staple groceries. For several years, Konnarock has had an accredited four-year high school. Our high school girls attend this school—we teach only the grammar grades in our own building. With the decrease in our population, it is questionable whether or not the high school will continue another year.

Konnarock Training School was organized in December, 1924, by the Woman's Missionary Society of the United Lutheran Church, having as its purpose "the education of children in the Southern Highlands." We are the only mountain school (as "mountain school" is usually interpreted) in the work of the United Lutheran Church. Our boarding students, thirty-five girls ranging in age from twelve to twenty, come from the mountain sections of five states: Virginia, North Carolina, Tennessee, Kentucky, and West Virginia. Most of them come through the interest of some church worker or from personal contact with girls who are now in school or who have been here. The sixty day students, boys and

girls, are from the community around us. The day students and boarding students are together in the classroom, and both receive the same instruction and attention.

The homes of day students and boarding students are not unlike in their general conditions. To one unacquainted with living conditions of the Southern Highlands, these homes seem dreary indeed—unpainted, poorly constructed, and with only the barest necessities for furnishings. Most of the fathers are "small farmers," either renting or working for another farmer, or, in some cases, owning their own little steep rocky farms. There is very little handling of money in the homes of these people. Some of the children never rode on a train until they came to Konnarock. A telephone, water running from a faucet, electric lights, moving pictures, contact with another race—all of these are entirely new experiences to most of them. Produce or labor is exchanged at the country store for credit, often of a year's standing. We ask twenty-five dollars in cash or produce for tuition at our school. Many of the families find real difficulty in paying even this.

When the school opened in September, 1925, there were nine boarding students and ten day students from the community; the principal, a nurse, and a housekeeper made up the staff. With the limited staff and equipment, the teaching followed the usual order of one-room-school work. In December, 1925, we moved into the new school building, where we had room and equipment beyond the average country school. Our teaching staff was increased; our enrolment increased. Still we were doing only stereotyped public school work. With the close of the 1925-26 school year, we felt keenly that we were getting nowhere!

We felt the need of knowing our children better, in their homes as well as in school. Our grade education was not vital. It took only half an eye to see that "lessons" to these children were only "books to go through," and

then at the beginning of another year, another set of "books to go through." The old rote type of work seemed to be their idea of good work. Words were words to be memorized and given back to the teacher. A museum; a city, a factory—these words full of content for the average child, brought no picture to these mountain children. "Seeing" the factory or the city was impossible because of their limited experience. A map had no meaning to these children who had never gone beyond their own blue hills.

The Southern Women's Educational Alliance has for some years been interested in mountain girls and mountain schools. They desired to continue their study. We were a new school seeking light upon this great problem of rural education. And so it came about that the Southern Women's Educational Alliance joined forces with us in an effort to help make education vital for the children of our mountain section.

Careful case studies were made of each child and her home. The homes of the boarding students in North Carolina and Virginia were visited, and thus we learned to know our children in their own homes—learned to know their parents and their ambitions for their children. Mental and educational tests were given in the school rooms. The children were placed in groups according to their ability. Our curriculum was enriched with a great deal of extra material.

The old system of forcing a child to take all classes in the same grade was broken up. According to the light which we had from our psychological tests, our home visits, and the judgment of our teachers, each child was placed in a group where he could best work. We remember Hiram, "the trader." Hiram was the best arithmetic student in the class, as well as the best trader in the community. He had his answers to his problems long before the other boys had theirs stated. While the advanced arithmetic class recited their lesson, Hiram often forgot that he was not a member of their class, and he added his figures to theirs. But Hiram could not get his geography and history; somehow they were beyond his com-

prehension. Then again, we remember Lucy. Even Hiram could not teach her arithmetic, but her little mind had a wealth of interesting history facts, gleaned from magazines and pictures which she had seen somewhere. At the close of the year we asked ourselves, "Whom shall we promote?" Lucy could not do fifth-grade arithmetic; in fact, she did not know the fundamentals of the subject; and it would be foolish of us to expect subsequent work from her. Hiram could not do fourth-grade history, much less sixth-grade, but he was fully capable of doing sixth-grade arithmetic. The same was true of half the other students. And there was Mary, who was by far our best little seamstress, but who saw absolutely no sense in arithmetic and history. So Hiram and Lucy and Mary were allowed to go as rapidly as they cared to in their own beloved studies; and they were given extra help in their slow studies according to their needs.

The idea of failure was abolished except where a student showed plainly that he was unwilling to try. The motor-minded child was given additional manual work, or the opportunity to work out his history or arithmetic by some creation of his hands. Those children who could go more rapidly were given supplementary reading and special assignments. More was expected of them than of the less capable child in the same group. Each child was rated or measured in terms of his own progress rather than by comparison with the progress of the other members of the group.

In the beginning there were a great many demotions. Many of the parents were dissatisfied that we had put their children into lower grades. So long as "grades" existed in our thinking, there was this dissatisfaction among the students as well as the parents. We changed our "grades" to "groups" A, B, and C. We laughed at ourselves when we said "grades" by mistake. We wrote compositions on "The Old and New School," "How We Can Improve Our School," "Reasons Why I Like the Group System Rather Than the Grade System."

But this was not enough. We needed to break up the idea of "English" as a study all to itself; and "History" as having no connection with anything in our present-day existence; and "Hygiene" as the study of health. We undertook a number of projects combining all the studies. One class spent several weeks studying Early American History. Reading lessons were supplementary history material; English lessons were stories, letters, and finally a play of the "Landing of the Pilgrims." The boys built a little log cabin and the stockade. The girls dressed their dolls as Indians and Pilgrims. All of them made Indian pottery and colonial rugs. They made laws for their colony and discussed the need of schools



An Indian Play

and churches. All of this led to the play at Thanksgiving time. It was written, costumed, and presented by the children. The early American settlers became a reality. They lived, just as the children lived.

The Arithmetic class wanted a store. They "rented" one of the classroom closets; borrowed "money"; gave notes, bought stock, and figure interest, in the remitting, equipping, and stock of the store. They sold pencils, tablets, and crayons to the other school children. By turns each child played clerk for a whole week. Each night the money must be counted and reported. Notes and bills fell due. Letters regarding all this business must be written. This store, called "The A & E (Arithmetic and English) Supply Company will take care of selling of school supplies. Many such projects brought English, History, Arithmetic, Civics, Geography, and Hygiene all together,

and broke down forever our attitude of "English for the sake of English." So completely were all classes coordinated that often the children would ask, "Are we having English or Geography?" With all of this, our state course of study has been very closely followed. We use state textbooks—but we use others in addition. We give the required number of hours to each subject—and often more.

This took care of our class room work, but there were still extra hours which offered further opportunity for general education and character building. All of our work in and about the school is done by the girls. Certain ones clean the hall, others the classrooms; still others wash dishes, prepare vegetables, set tables, and help with the cooking. These groups change tasks every three weeks, thus giving opportunity to each girl to do the many different tasks about a home. All of this work is under the direction and supervision of the home economics teacher. It is understood that it is a part of the home economics work. The girls are taught how to do a certain piece of work; they are then supervised in the doing of it, and graded upon the results. This is in addition to the regular hours of classroom work in cooking, sewing, and handicraft.

We try, in all of our home economics projects, to adapt our materials and plans so that the training is usable for our girls when they return home, or later, when they establish their own homes. Just now the girls are studying "the ideal kitchen." They have learned the necessary equipment for a kitchen, and they are now figuring how they can equip their kitchens on a very limited income. Since we cannot go to the stores to do our shopping, various mail order catalogs serve for our window shopping. They cannot buy everything they see in their "wish books," but they can plan to have the equipment really necessary in the average farm kitchen. The menus and recipes used are those which would be practical for the average mountain home. Fancy salads and soups are out of place, but salads and soups as such do have their place even in the average rural home menus. The common courtesies of everyday life, table etiquette, the

duties of a hostess, the duties to our hostess, introductions, invitations, suitable dress, and all such, find a place in classroom discussions. The girls make their own clothes, whether new or made over. They care for their own rooms, as well as make their own curtains and any other "interior decorations" which they wish. Often they take charge of the entire meal, or a party, or a birthday "banquet."

The problems of budgeting are taught with

service in their homes and communities. From this little touch with nursing, many of the girls have expressed their interest in nursing as a profession. These dreams may be short lived—

All of our girls may have music lessons if they wish. Music in its broader sense is a very real part of our interests. A victrola, a radio, and two pianos—one or another is always in evidence. Quiet hours of music ap-



the handling of our own "K.T.S. money." At the end of each three-week period, the girls are paid for their work according to the number of hours the various tasks require. This paper "money" is used to buy clothes, school supplies, and such other things as the girls may need. Some of the girls use their "wages" well; others are careless and need to learn to handle their accounts more carefully. But such is life!

Our school and community nurse has had the older girls in a class in practical home nursing and sex problems. These girls, especially the high school girls, can learn to care for the average cases of illness and can thus be of real

preciation, stories of the great composers and compositions, and the singing of ballads, hymns, and other songs, are also regular parts of our life. Rhythm, folk dancing and games, the Virginia Reel, the Minuet—these link our physical education, music, and even history and geography together. These are usually outside school-hour activities, but sometimes they find their way into the classroom.

A Girl Scout troop has added wonderfully to our extra-curricular material. From a cultural point of view as well as an academic point of view, we consider our Girl Scout work quite worth while. Through all of this we hope to enrich the present lives, and

thus the future lives, of our students.

Our "religious education" as such has been no small part of our work. Definite Bible work is done in the classrooms, as well as in our religious organizations. This consists of memory work, the making of notebooks, stories, and dramatics. Chapel each morning before school is not just a devotional period with songs and scripture readings; but a dramatic presentation, some special music, a poem, flag salutes, and, most often, a story—these make our chapel services a cultural agent as well as a religious expression. We have the usual church organizations: Sunday School, Young People's Society, and Children's Missionary Society. The children take active parts. They tell well their stories, or express very acceptably their opinions on some given subject. The older girls teach Sunday School classes after first having been in a teachers' training class taught by one of the teachers. We have church services twice a month. These services are not only for our girls, but for the community as well. We do not have a regular pastor, and often our Sunday night programs are stereopticon

lectures or Bible characters. (This same stereopticon machine also affords us visits to other countries and peoples in parent-teacher meetings, as well as being of use in the classroom.)

Just how far we would have traveled along this particular road without the guiding hand of the Southern Women's Educational Alliance, we do not know. At least we were not satisfied with our work in 1926—nor are we "satisfied" with our work in 1930. We do believe that we are on the right road to helping our girls and perhaps other mountain girls, to live "a more abundant life." A definite effort has been made to give the individual child that which she most needs to strengthen her weak points, to teach her to think and reason, to broaden her background and vision, and to make her school work vital and of some practical present value to her as an individual. All of our ideas are parts of various educational policies; but we must now concentrate our efforts in trying to formulate for ourselves a more tangible educational and vocational philosophy for our own situation.

CHURCH PROBLEMS IN THE MOUNTAINS

E. V. TADLOCK

The story of church building in the mountains is largely linked with that of the Mission Schools. Indeed, the Mission School was the outgrowth of experience in evangelistic effort. Pioneer evangelists found themselves facing insuperable obstacles. There was stubborn prejudice and opposition to "paid preachers" and "brought on religions." There was a total lack of capable and dependable adult leadership. Among a people where individualism was rampant and the first lessons in cooperation unlearned, schism and faction immediately developed. Such churches as were organized, quickly disintegrated. There was no foundation upon which a church could be built.

It became evident that if the mountains

were to move forward, it must be upon the feet of little children. Consecrated teachers were introduced—most of them women. They started schools. The beginnings were small indeed. There were almost no school buildings in those days; many of the teachers gathered their groups under the shade of a great tree. Only the little ones came at first, and the work was primary. They were taught the A B C's and the numbers; of the Father in Heaven, who loves and cares for all, and of His Son, the Christ, who came that they might live holily and happily. The people early appreciated the value of "larnin'." And proud indeed were the parents who could point to a child as a "pure scholar."

The children grew and progressed; others came. It became necessary to introduce higher grades and better equipment. Teachers won their way into the confidence and affection of communities. The people cooperated in the erection of school buildings. Sunday Schools were organized and tolerated. Preaching services were held and the gospel invitation extended. The children began to respond—not rapidly, because of parental objection and community prejudice. The progress has been long and tedious; but step by step the foundation has been laid ever more broadly and deeply. Few students remain in boarding departments without becoming Christians. Many of the graduates have erected Christian homes. Some of them are church officers and Sunday School teachers. Scores teach public schools. Many are pursuing their education in normal schools, colleges, and universities.

The wisest and most successful of all the churchmen in the mountains has said, "I would not attempt a church operation without a school at the heart of it." It is apparent to those versed in the work that for a good many years to come the maintenance of a few strategically located, well equipped, efficiently manned schools in the rural sections is essential to the church programs.

The writer was asked to speak of problems confronting church work in the mountains. In doing so, he is thinking especially of peoples who are still "under-privileged," though some of the suggestions apply to newer "strategic centers" developed or made evident by highway construction, industrialization, or other progress.

The first problem is that of pastoral leadership. Before the flock, there must be the shepherd. He must know his sheep, and be known of them. Usually he has to be "brought on," and there's the rub. An Oberlin can do a constructive work anywhere. But, how few the Oberlins! Those who wish to know the kind of pastors needed are referred to "The Story of John Fredric Oberlin."

The second problem is that of local leadership—adults who qualify for church officers and Sunday School teachers, Christian leaders

whose interest and efforts will be sustained. Twelve years ago a representative of a well known Sunday School agency entered upon work in a mountain county. His plan was to organize as many Sunday Schools as possible—ten or a dozen—visit them over a period of eight or ten months, and then move on to another county. Not one of them survived. Local leadership was lacking. The development of leadership is perhaps the most difficult and tedious church problem in the mountains.

The third problem is of financial support. It takes money to salary a pastor and operate a church. The people have little of it. Paul said that liberality is a grace in which people have to grow. Such growth is a slow process, especially among those who have been taught that "the gospel is free." But if the people gave to the limit of their ability, the major part of the support would still have to come from outside sources. Home Mission agencies of practically all churches are facing shrinking incomes. Few are opening new work. Most of them are retrenching. If the present trend continues, the gospel outlook of under-privileged sections is problematical.

The fourth problem is that of denominational rivalries, such as is shown by a verbatim report taken from the 1929 Minutes of a major denomination.

The quotation follows:

"The subject of District Missions is one which should appeal to every member of this body. If we are what we claim to be, we will be stirred within our souls when we view this field as it really is."

"It is a fright to think of the rotten doctrine that is being taught among the people of our Association. Such as——ism,——ism, Holy Rollerism, Campbellism, Russellism, Mormonism, Spiritualism, Hardshellism, and last but not least, Communityism, which is the devil's last resort. Many of these false denominations have their schools and use them in spreading their propaganda, and thereby entice our young people. These false denominations are not Christianizing the

mountain people, but Romanizing them. (Sad but true)."

"If we do not take this field the enemy will, and we need not be alarmed that they do. The churches must awake and do something or we shall see the cause of Christ suffer more and more each year in this country, which rightly belongs to our church."

It would be supposed that where there is such room and virgin need, over-lapping effort and sectarian antipathies would be absent. While some denominations do preserve comity agreements, it may be said that nowhere else are sectarian offenses so grievous and destructive as in the mountains. The establishing of one church too often invites another. One school is sometimes built under the eaves of another. Judged by spirit and method, some appear more jealous to tear down the work of others than to build their own. The ecclesiastical waste of this folly has been tremendous. If there were no such thing as grace, it would seem that gumption would intervene.

A fifth problem frequently grows out of the relation of the Mission School to the Mission Church. The school laid the foundation for the church. The church is often organized and its services held in the school chapel. The pastor and the principal are usually the same person. The school must be run for the community, but the church must belong to the community. The two institutions must be kept

distinct in the minds of the community. This can never be so long as the church is in the school building and the school dominates the church. All over the mountains there are church schools defeating the purpose for which they are maintained—namely, the development of a self-sustaining church. As quickly as possible every congregation should have its building, and that building should be at some distance from the school campus. It is an axiom, and ought to be accepted, that a church can not be built in a school chapel.

A sixth problem is that of shifting populations. But that is the problem of the rural church everywhere. Other problems there are, but those named are the major ones.

If this article appears pessimistic, it must be borne in mind that the discussion has been of problems, and especially of rural problems. The writer is no pessimist. Splendid progress has been made, and is being made. Each year the "under-privileged" mountain areas grow smaller, and the "under-privileged" peoples fewer. Scores of centers which a few years ago had no churches, or very weak ones, now have flourishing congregations modernly housed. Large areas are becoming religiously conscious.

After all is said, however, for many years to come there will be "under-privileged" people in the mountains, and for the gospel these "under-privileged" must look to Mission agencies of the churches.

RURAL ADULT EDUCATION AND AESTHETIC INTEREST

JOHN D. WILLARD

"And the man grew faster than the crop." These words of Dr. Seaman A. Knapp, pioneer of the agricultural extension movement, indicate the real yardstick for measuring success of extension teaching. Dr. Knapp is honored for his contribution to the economic welfare of the south, but his contribution to the intellectual stature of rural people was even more important. This truly great educator measured the result of educational effort in

terms of intellectual welfare and of happiness even more than in terms of skill acquired and of economic gain.

We, too, are here concerned with the growth of the individual to a richer life, and with better adaptation to environment. We are thinking of the millions who comprise rural America, rather than of the minority who penetrate

* Reprinted by permission from The American Magazine of Art, December 1929.

more deeply the realm of the aesthetic. Success of a democracy is tested by the extent to which the rank and file share the benefits of a nation's progress, not by the superlative achievement of a few at the sacrifice of many. Leaders in adult education, whether students or teachers, are concerned primarily that great numbers of men and women gain ability to appraise more correctly the values of life and to enjoy more keenly those things which prove worthy.

Many steps may be necessary in this growth. Spiritual certainty and poise in the midst of physical uncertainty may be the achievement of saints and philosophers, but the first step for men of ordinary clay is the attainment of some economic security, without which peace of mind is impossible. Food, clothing, shelter, and some surplus against misfortune are essential for the best mental growth. Farmers are at first interested in bettering their economic position through greater vocational skill. Earning a better living is, however, an empty achievement if it does not result in the living of a finer life. The next step in adult education must, therefore, be one of intellectual growth. But still more than intellectual growth is necessary; life should contain the positive element of joy, of happiness, based on appreciation of life's true values. Because joyfulness is rooted in emotion, the crowning step in adult education is the development of a disciplined emotional life in harmony with the intellectual life; a process which is at bottom intellectual, but which results in sound emotional habits.

In the light of the foregoing the adult educator cannot disavow interest in aesthetics. His task is not finished unless the student grows until some of life's less tangible values become his real and satisfying possession.

Other assumptions can be stated briefly. We assume that adults can learn—that they can gain skill and appreciation. We assume that rural people have a hunger for the beautiful, though this hunger is often unrecognized and misunderstood, and that rural people are as capable of growth in aesthetic appreciation as are their city cousins. We assume that adult education is not competitive with the

education of children and youth, but is complementary thereto. In fact, so long as the child lives in an adult-regulated home and is moulded by adult-regulated systems of instruction, any profound change can come only as there is change in the attitude of adults. Children and adults must make growth together.

Some Factors in Rural Life

Rural America is not an entity. Climate, soil, topography, agricultural resources, and social institutions show extreme variety. No standard formulae can be found for the solution of economic or social or education problems. In general, the more remote an area is from urban influence, the more meager are its economic resources for life on a scale acceptable to progressive American people. Slender economic resources mean primitive utilities or none at all. After the first pioneer generations have tested the economic possibility, those who continue to live in a poor agricultural country with primitive utilities and agencies lose some of the cultural and social heritage which was the possession of the pioneers. The countryman must solve his own problems. Hence he becomes an individualist and a conservative, and the greater his isolation the greater his conservatism. Rollin Lynde Hart remarks that in isolation of the country a man tends to think himself through to his own logical conclusions; he becomes the "exaggerated essence of himself."

But isolation is diminishing. Rapidity of change is also characteristic of American rural life. Is the change to be progress, drift, or retrogression? Please credit me with sincerity and optimism, even though you charge me with conceit, when I assert that the quality of education which rural people get in the next ten or twenty years will determine whether rural life emerges strong and sane or meets disaster; whether rural people will be able to contribute stability and strength—perhaps even salvation—to our national life, or will only add their bewildered discontent to the ferment, which, despite prosperity of a kind, is creating the newer problems of our urban civilization.

Rural Culture

Let no one imagine that rural America is today without a culture, real, spontaneous, indigenous. Survey the activity of the voluntary organizations of rural people and you will be impressed with the place given in programs to music, literature, and drama. If you are inclined to measure the quality of these cultural activities by the urban yardstick, you will smile or perhaps groan; but suspend



A Maker of Dulcimers

judgment, please, until you weigh the fact that these people have the vitality to undertake their own cultural activities without the assistance of professionals; that they have a cultural resourcefulness which leaves the frequenter of plays or concerts quite passive by comparison. At any rate, a solid foundation of desire for musical, dramatic, and craftmanly self-expression is discoverable almost everywhere in rural America. But let some illustrations give evidence.

Rural Musical Appreciation

The violin, or, in humbler designation, the fiddle, has been ubiquitous in America from early days; likewise, the single-bass or its successor the 'cello, and the double-bass. A census of parlor organs fifty years ago, of pianos twenty-five years ago, of victrolas and radios today would go far to establish the fact of well-nigh universal music hunger. The real test is, however, in attitudes and actions. Several years ago the Iowa State College of Agriculture initiated a music-memory contest among the boys and girls of the state, and also a contest for farm orchestras culminating at the annual Farmers' Week at the college. During the same period the State University of Iowa developed the annual high school orchestra contest, culminating in the music festival at Iowa City. These various approaches strengthened each other by creating a music consciousness throughout the state. During this last year the high school contest brought together twenty-nine hundred high school students at the time of the music festival, these being the winners in local elimination contests. At another time during the year three hundred farm boys and girls, prize winners in another contest, were assembled at the State College for a week, and formed a complete orchestra. Also, in the final contest of the farm orchestras composed of adults, nine of the twelve selections played were, if I remember rightly, classical, and were interpreted with fine feeling. But the most startling evidence of musical growth came as an expression of preference by the people of Iowa farms in the matter of programs. The State College radio station had given many classical programs and tried a popular program in response to requests. At the close of the popular program the announcer requested an expression of preference by the radio audience. The first thousand letters were tabulated. Nine hundred and sixty-three expressed a preference for the classical music.

Iowa probably stands at the top of the list in musical appreciation, yet we find evidence of a musical response and appreciation in all places and among all kinds of people. Bethany

College and the Lindsborg community in Kansas are the focus of as virile a musical life as will be found anywhere; and this is distinctly related to the fact that Bethany College also has a remarkable fine arts department. St. Olaf's choir in Northfield, Minnesota, is recruited in good measure from Scandinavian rural communities. Rural music festivals range from Connecticut southward to Louisiana, and westward to the Pacific. German Saengerbunds have their counterpart in the singing Finnish communities of the iron and copper country. The negro makes a distinctive and irrepresible contribution. Appalachian Highlands ring with folk-songs, secular and religious; in fact, one has hardly heard congregational singing unless he has visited the churches of the South. The fishermen of the coast and lakes and the lumbermen of the north woods still have repertoires of their own. Music is one of the common denominators of aesthetic and emotional life in rural America.

The Drama

Mr. Duffus reminds us in "The American Renaissance" that the combatants are not yet agreed whether the drama is art or literature, or neither, or both; but that again is not so very important. The drama itself is important in rural life. The Grange, for example, our oldest national farm organization, has always featured plays. Local Granges are encouraged to provide both music and dramatic committees. Exchange of plays is a common form of inter-Grange activity. Some colleges and universities provide specialists in community drama. Professor Arvold's little theater in North Dakota has made the state not only drama-conscious, but play-hungry. The smallest of communities or neighborhoods are among the most successful in presenting plays. The University of North Carolina, under the leadership of Professor Koch, has developed keen interest in the writing of folk-plays; a movement acclaimed as containing the germ of a truly American drama. The Carolina Playmakers have a national reputation. The Carolina Dramatic Association includes sixty groups of local or community players, some of which are rural. The Agricultural Extension

Service at Cornell loans several thousand plays each year to rural players' groups in New York State. In the Wisconsin Rural Drama Tournament this last winter 1,200 people played parts in 170 competing groups in 20 counties, the plays being seen by audiences ranging from 150 to 2,000. Next to music, amateur drama is, perhaps, the most widespread form of organized cultural activity. Crude though it may be, it evidences intellectual resourcefulness, and through it a widening range of aesthetic interests can be developed.

Architecture and Craftsmanship

It was inevitable that craftsmanship should come to America with each new colonization; also, that the new environment should modify craftsmanship—should, indeed strengthen it through the pressure of dire necessity. A rigorous climate in the north and an abundant supply of timber introduced a new chapter in building. The sterner the climate the greater was the need for ingenuity in surviving it; the more meager the agricultural resources the greater need for skill in maintaining existence. Implements and furniture were under a new kind of usage, which brought forth new designs. Early American craftsmanship served utility first of all, yet with surprising regard for the beautiful.

If charm is a test of aesthetic merit, much can be said for the village common, white houses, and over-arching shade trees; for the simple architecture of the second century of New England building. Several types have met the test and are more popular today than ever. Wood-work in these earlier houses—fireplaces, mantels, settles, timbering, paneling, cupboards, stairways, doorways, windows, and mouldings—these all show not only sound craftsmanship but discerning taste. Furnishings, from grotesque to beautiful, were produced by local craftsmen, always with high regard for utility.

The same craftsmanship, conspicuous for its merit in New England, was exercised in the other colonies, always with adaptation to climate and condition. Is anything more inviting than the Dutch farmsteads of the Hudson River

region, or more substantial than the stone buildings of Pennsylvania? In the mansions of Virginia the classic portico appears with much better utility than was achieved for the same type in New England houses. Is there anything on the American continent that approaches the restful dignity of Virginia mansions in ample settings of lawn, gardens, shrubs, trees, and meadows? The Spanish Mission introduced a new note to the South, but the adobe is the truly native contribution of the Southwest. Log houses of the Finnish people in the iron and copper country are not only of the best craftsmanship but have a distinctive and surprising charm, always harmonized with utility. Indeed, throughout the timbered area of the United States the log-house has earned a permanent place.

This recital has been given in order to bring into prominence the accumulation of patterns and traditions in rural American life; for all that I have cited is rural. You may rejoin that the recent generations have shown scant appreciation of this wealth; yet I am convinced that the beauty-hunger is there, that the rural people of America need but little guidance to find the scales falling from their eyes, and craftsmanship reasserting itself. Indeed, the newer interest is more open-minded, more catholic in its taste. Again, let us turn to examples. Dr. Mulford of the United States Department of Agriculture spent part of the years 1919, 1920, and 1921 with county extension agents in the South, working on plans for home beautification. His work was closed eight years ago, but the movement continues. Reports of the agents in these states for the last year show home landscaping undertaken on 70,614 farms; and the total reported for that year by the extension forces in the United States was 90,483. One extension specialist in landscape architecture reports that every day in his schedule, with three exceptions, is already booked until March 31, 1930, all this time being engaged for assistance to rural people; that planting plans have been made for 750 farm homes; that demonstrations have been established in 32 counties; and that in each 12 counties, four half-day landscape

sessions for farmers have been scheduled. A Kansas extension specialist in the field of nutrition has been persuading farm women of her study groups to undertake planting of their farm homes, so that these homes, at least, shall be distinctive for their beauty. Community score cards which have been developed in various parts of the United States as a guide in making plans for community growth, point to a new interest in the possibilities of the community beautiful.

Two thousand four hundred and four county agricultural agents are potential carriers of the gospel of home enrichment by planning and planting. Hundreds of them have already given such help to farm men and women. One thousand one hundred and thirty county home demonstration agents are teaching farm women better clothing selection and construction, home arrangement, interior decoration, and home furnishing. In one North Central state it is reported that 80 per cent of those who visited a fine arts exhibit at the county seat were farm women who had become interested in the fine arts through their extension classes in clothing. From one Michigan county it is reported that 180 women purchased the Goldstein sisters' book entitled "Art in Everyday Life," this being a direct result of extension classes in clothing construction. Remember that the extension staffs in the United States Department of Agriculture and agricultural colleges total 5,600 technically trained persons, that this entire service is established for rural America, and that it constitutes the largest coherent adult education organization in the United States, if not in the world. It has tremendous significance for the future of intellectual and aesthetic life in America, as well as for the purely technical.

It will be profitable to review briefly some of the pedagogical experience of this organization, which has dealt with mature people of keen, critical ability and highly developed individuality. It has been found that teaching must begin at a time when people are interested, on a subject which seems to them of immediate importance. The first teaching must

concern something concrete, definable, visual if possible. Problems must be within the range of the students' present ability. If the teaching concerns a new practice, a demonstration of that practice or method or result is essential; without it, doubts gather momentum, interest lags, confidence wanes. Teaching must be translated into *action* by the student; hence, the plans must provide things worth doing. Interest once established widens to related fields, ultimately to more remote fields. It is also necessary to be sure that the materials for better practice are within easy reach, whether the practice concerns things agricultural or things domestic. Interest, confidence, and desire increase with successful achievement. It has also been the policy of the various extension services to use any existing organizations or agencies in making the first approach, thus avoiding the necessity of building new machinery. Entry to interest has often been made through the side-door approach of Grange, farmers' club, fair association, or ladies' aid society, when the front door was closed and barred to any new organization. Because of the scarcity of professionally trained agents and of funds for their support, it has never been possible to develop an extension staff large enough to undertake the direct teaching of all who desired it; hence, it has been necessary to use what is known as the leader-training method. Neighborhood or community groups send their most capable leaders to convenient central points where the leaders receive training from specialists and county agents. The leaders then return to their communities with the message and material which has been given to them. Many fears were expressed concerning the accuracy of such teaching, but the test has shown that a surprising amount of technical material can be so carried to the remotest of communities. It has been the more necessary, however, to support each stage of the extension teaching with plans and materials that can be used by volunteer leaders. The significance of this whole movement grows upon us when we realize that scores of thousands of volunteer leaders have been used successfully in carrying

educational values to millions of farm people.

One of the tenets in the creed of rural educators is that any organization which expresses spontaneous rural activity may be used for purposes of extension teaching, although but a fraction of the existing agencies are so used. Nearly all rural organizations are an expression of the community's determination to serve itself, and to achieve through its own efforts those things which in urban life can be had more conveniently through the service of professionals.

As I vision the renaissance of rural America, three steps, at least, are necessary:

1. A new and constantly enlarging vision of possibilities must create a desire for growth.
2. The materials by which growth is possible must be made accessible or understandable to rural people.
3. Leadership and guidance must be provided.

Here again I am entering a strange country, but I assume that the stimulation of aesthetic interest and education in aesthetic values will follow the same general development that has come in other fields. I realize further that all the suggestions are general; that they are doubtless fallacious in some respects and that detailed plans must be developed on the basis of local resources and local attitudes.

How shall a new vision of aesthetic possibilities be brought to a rural people? First, by aiding rural people to discover the beauty which is at hand; mountains, brooks, trees, flowers, sunsets, the sweep of the plains, fresh green following rain, and the rich gold of ripening grain. No environment in America is wholly devoid of beauty; most landscapes have untold wealth for satisfactions, sometimes in minute detail, sometimes in the elements of grandeur and extent. The man or woman totally devoid of craving for beauty is rare indeed. Here, then, is the task; to make rural people aware of the enjoyments at hand. People can also be guided to appreciate the beauty of the finer, simpler buildings and of furniture perhaps now in the woodshed loft. People

can be aided to evaluate, which means to appreciate, beauty of the better music. Mr. Damrosch and the Radio Corporation of America have in two years done the most stupendous piece of cultural education and stimulation ever accomplished in the world's history. Much can be done to focus attention on any meritorious works of art, to feature the better literature. Increasing interest in any field of aesthetics is gain for all fields.

How shall materials for growth be provided? By materials I mean bulletins, books, texts, works of art, plays that communities can produce, music that community orchestras can play, plans that can be followed in house building, remodeling, or landscaping. Probably the extension service in agriculture and home economics can do more to carry this material to rural people than can any other agency. The public library system is very important, but 82 per cent of our rural people are as yet unprovided with local library service. The public school system, wherever it has readjusted itself to adult psychology and is equipped with capable staff, can do much and should be encouraged in every hopeful way. Voluntary organizations with capable leadership, and with state or national connections through which materials can come, will always play an important part. But behind these statements lurks a deeper question: where can these organizations and agents secure the materials which they are to carry to rural people? It rests with institutions, agencies, and organizations with some resources to prepare those things which are necessary, and to provide them in sufficient quantity for the need.

How can leadership and guidance be provided? This is indeed the most difficult problem of all. No complete solution will ever be found, but much can be done at once. Strengthen the hands of those extension agents, public school teachers, librarians, and leaders in the voluntary organizations who are already interested. See to it that sound artistic educational opportunity is open to home economics specialists and home demonstration agents, to landscape specialists, to agricultural engineers who are planning substantial, convenient buildings,

but whose artistic perception may not have had training. Expose public school teachers in training, and teachers in service, to the opportunity for personal interest in things aesthetic. Give the lay leaders of community music, drama and literary activity the opportunity to attend brief institutes so that they can go back to their communities with new ability.

Other opportunities for influencing rural aesthetic appreciation are before us all the time. But no single agency can do all these things. A national organization cannot successfully undertake a direct service of teaching but it can stimulate and guide; can provide a board of strategy, a service of supply, a clearing house of information. The American Federation of Arts can continue and enlarge its wonderful loan-exhibit service. Perhaps it can encourage the stronger local chapters to do likewise. It can prepare suggestive and elastic plans for use by local chapters. It can undertake the preparation of published materials, with a rural clientele in mind. It can serve as a clearing-house of information concerning significant achievements and projects of local chapters or of organizations wholly outside of affiliation with the Federation. It can promote experimentation in new ways of approach to the rural population; as, for instance, the concerted use of newspaper and radio. But I cannot escape the feeling that time, energy, and money spent in stimulating more local agents to activity will reach more people than the same expenditure by a national organization in effort for direct contact.

I cannot forbear an appeal, not in behalf of rural people particularly, but in behalf of the United States as a whole. Our terribly efficient machine age has increased the creature-comfort of the ordinary man. It has put new equipment in his home, and has enabled him to possess luxuries beyond the dreams of his ancestors. It has lengthened his leisure, but it has not given him any guidance for the wise use of increased leisure. It has not provided him with worth-while things that he may do. Worst of all, it has deprived the machine worker of opportunity for creative self-

expression of craftsmanship. Twenty-five years ago a factory product was essentially the work of a small group of men—sometimes of a single man—and the craftsmanship of the individual was discoverable. Men took pride in their handiwork as embodying a part of their very selves; it partook of their personality. But who can discover his personality in a ton of quarter-inch bolts, all alike, which he has in theory produced but which he cannot see in the process of production, and which immediately lose all identity in 10,000 standardized automobiles. What happens to the personality—yes, to the citizenship and soul—of a man who works day after day at a high-speed machine? To complete the annihilation of craftsmanship, men are ceasing to live in their own houses set in their own gardens. If the majority of machine workers owned their homes with reasonable expectation of a permanent residence in one place, there would still be opportunity for craftsmanship to express itself through the enrichment of the home, but there is no incentive to beautify a house which six months hence may be occupied by another, or to nurture a garden which the next tenant will probably neglect.

The farmer has always been a craftsman and must always be a craftsman. In agriculture, personal skill will always show in results, and will continue to be a basis for the satisfaction which comes from creative work. It is

true that farmers must become more cooperative, which means that they must yield their extreme individualism, but farmers will always be individualists. Wives and children in farm homes have always exercised craftsmanship and must always continue to do so. It is true that craftsmanship in farm life often sinks to materialistic levels; that men and women lose sight of the satisfying aspects of creative effort, and that life thereby loses much of its joy. Yet the possibility of satisfaction through craftsmanship is always there. Never will our farm people find themselves in the predicament of the urban machine workers of today.

If it is possible to save to farm people the finer sense of craftsmanship, to transfer some of their creative effort to non-economic activities in which the sheer joy of creating is the only reward, a mighty contribution will be made to the steadying and strengthening of rural life. The import? The rural people of America may yet save our civilization by keeping their own intellectual and philosophical balance when the people of our huge industrial life are floundering through social and intellectual confusion to a new order. Rural America may yet provide a nucleus of stability around which a new order can be built. Let us do what we can to equip rural America for the task.

AN OZARK STUDY

CHARLES T. GREENWAY

Readers of Mountain Life and Work may be interested to know that a cooperative study of the religious needs of the Ozarks has been undertaken by the Home Missions Council and that the field work is now in process. (January, 1930). The follow-up conference for receiving and making use of the survey will be held at Hollister, Missouri, July 1-3, 1930.

This study, while of special interest to various Missionary Boards, has to take its place, more or less uniformly, in the Home Missions

Council's "Five Year Program of Survey and Adjustment." An Every-Community Survey of the entire area, with an intensive and detailed study of ten or more sample counties, is the extent of this seasonable inquiry into the state of religion in the Ozarks, this extensive region that has been given so little serious attention and study by the Church in the past.

Society in the 91 Ozark counties comprising the area, an area which might be roughly characterized as rural, native, white and Protes-

tant, is on an average about 115 years old.* It represents almost uniformly the extension of society from the older settled Mountain States east of the Mississippi River, and scarcely at all from foreign shores direct. And for the most part the migrations were from the poorer sections and of the less well-to-do people. But the land into which they came was similar to the parts they had left behind them—a land of rough and difficult character, which would naturally prolong for some generations their

recognizes the favorable aspects of his situation for home making and independent living; also that there is a better day in store and that he and his folk have a contribution to make to the nation.

The region outlined for the Survey, and for interdenominational cooperation in religious work, is intended to include a group of counties which for the most part present similar topographical, economic, and population aspects. The 91 upland counties thus included



pioneer experiences, which even yet quite generally prevail. But in such a land they were pleased to settle and quite naturally did so in a widely scattered and independent fashion. The outside observer can discern more significance in the lay of the land and in the character of the population than can the one reared there. And yet intuitively the native

are in three states; in Arkansas 30 counties, Southern Missouri 50, and in Eastern Oklahoma 11, aggregating 63,470 square miles. This area represents considerably more than half of the Southern Mountain area outlined by John C. Campbell, as comprising parts of Alabama, Georgia, Kentucky, Maryland, North Carolina, Tennessee, Virginia, and all of West Virginia, a total of 111,609 square miles.

The population of these Ozark counties (1920 Census) was 1,742,393, making a population density of 27.5 per square mile. If the

*St. Genevieve County and Washington County in Missouri (both 100 per cent rural) were settled in 1720. Early settlements in the majority of the counties, however, were made between 1810 and 1845.

approximate rate of increase recorded between 1910 and 1920 has continued to 1930, there should be about 50,000 more people in the area now than in 1920. The total Negro population is 59,699, about 60 per cent of which is found in eight counties, four in Arkansas and four in Oklahoma. Forty-eight of the 91 counties have less than 100 Negroes each. The number of foreign born or of foreign groups in these upland counties is negligible. The following comparisons may be made between the Ozark Area and the Southern Mountain Area:

	Population Density	Per Cent Negro
1910 Southern Mts.	47.8	11.7
1920 Ozarks	27.5	3.4

The 1920 Census recorded one city of over 50,000 population, two of approximately 30,000, and three with something over 10,000 each. For a region essentially rural it is of greater interest to note that of these 91 upland counties 63 are 100 per cent rural: 20 in Arkansas, 36 in Missouri, and 7 in Oklahoma. These 63 rural counties comprise 42,439 square miles and 876,225 people, i. e. 66.8 per cent of the area and 50.3 per cent of the population. Just how rural these 63 counties are, the size and distribution of the villages will help to show. For practical purposes the village here is considered as from 100 to 2500 population rather than 250 to 2500. Community centers of 100 to 250 population in this area are too important to be left out of the reckoning.

Should the "village" having a population from 100 to 250 be eliminated, the total number would be reduced from 473 to 234.

Holding to the larger total of 473 villages there would be an average of $7\frac{1}{2}$ per county, or one for every 89.7 square miles. But one

county of 804 square miles and 15,600 people has only one place that could qualify as a village of 100 or over! Another county of 746 square miles and 11,000 inhabitants has two villages; three counties have either three or four villages each; twelve counties have five villages each.

Taking the Missouri group of 36 counties that bear the 100 per cent rural tag (on account of having the data at hand for these only), the following comparison may be of interest as suggesting the availability of community centers of the village.

Villages in Thirty-Six Rural Counties

Total villages	----- 263; Average per county	7.3
Total School. Dist.	---2576; Average per county	71.5
Total votin Precints	---763; Average per county	21.2

It might also be pointed out that the majority of the one hundred per cent rural counties in Arkansas and Missouri registered an actual decline in population as between 1910 and 1920. This would indicate that the hamlets are not likely to grow large enough to graduate into villages. Hence the total number of villages in these rural counties is not likely to increase very much.

Ideally the Church should be so located and sustained as to bring all the people and all the territory under pastoral care, whether the Church centers in the villages or also in many community centers that statistically are quite unpretentious.

In the entire area, 73 denominations are represented, with approximately 5500 churches and 524,000 members. This would indicate that about 30 per cent of the total population are church members and that the average church has a membership of about 95 people.

(Editorial Note: We hope to present further findings of this survey in a later issue.)

NUMBER OF VILLAGES WITH POPULATION FROM 100 TO 2500

Section	of Counties		Class of Village			Total number of villages
	Number	100-500	501-1000	1001-1500	1501-2500	
Arkansas	20	128	22	5	6	161
Missouri	36	208	35	8	12	263
Oklahoma	7	32	9	3	5	49
Total	63	368	66	16	23	473

LURE OF THE FOREST*

H. N. WHEELER

The question of forestry in West Virginia is largely a problem of land use. Of the fifteen and one-third million acres of land in the state, less than two million—not all of which is cultivated—is listed as crop land. Including the woodland pasture, amounting to nearly a million acres, four and one quarter million acres is classed as pasture land. This leaves nearly two thirds of the land of the state not producing farm crops or used for pasturage purposes. It is the use of these millions of idle acres with which we are concerned in discussing the forestry question. True, there are coal, oil, and gas beneath the surface, but eventually these will all be used up and unless the soil is productive, the land will be completely idle. No one can afford to own land and pay taxes upon it unless it produces something.

There is much demand in West Virginia for wood in the form of mining timbers and lumber as well as for wood to be used for fuel, paper pulp, railroad ties, and even for rayon to make clothing. Though cellulose, one of the chief wood products, for example, can be produced from corn stalks and other similar material, corn stalks are needed for fertilization on the farms and cellulose can better be produced from timber grown on land that will produce nothing else.

In a rough, hilly country like West Virginia perhaps the greatest value of the forest is in watershed protection. Trees retard the run-off of water, thus preventing the soil from washing, allowing the water to sink into the ground and become soil water. Not only big trees but even small trees and brush hold the soil from washing down the hillsides and into streams, clogging them and filling reservoirs with silt. No one needs timber at the expense of the watershed value of the forests. Associate Forester Sherman's report on flood control of the Mississippi watershed shows that if it were properly timbered, flood

waters in that great region would be reduced by at least four and one-half feet. Some reservoirs are filling up at the rate of one percent a year and others, where erosion is particularly bad, will be filled in fifty years.

The worst enemy of the forest is fire. Even in 1929 there were 63,950 acres burned in West Virginia, and throughout the United States fire burned over 43,900,000 acres of forest, brush, and grass land. Fires are started in this eastern country almost entirely by human carelessness. Some 25 to 50 percent of woods fires are started by smokers who carelessly throw away matches or cigar and cigarette stubs. The United States Bureau of standards reports that 170,000 cigarette stubs are discarded every minute of every twenty-four hours of the day. Some states are requiring that ash trays be placed in every automobile, and experiments are being made so that the match or cigarette will burn only a part of its length after being discarded. Many fires are started by the careless disposal of brush or by people burning over land under the misconception that it will improve the grazing. As a matter of fact fire destroys the good grasses, and only the poor ones with deep roots are able to survive. Fires not only destroy some of the green trees but they injure many more, reducing their lumber production. They kill the baby trees which would make the future forest, and they destroy the limbs and twigs which would decay and make up the soil of the forest floor. Fire bakes the soil and makes it possible for the water to flow off the surface in much greater quantity and much more rapidly, taking the humus with it.

Fire does even more than this. It destroys the beauty of the country-side and beauty has

* Abstract of the talk given by H. N. Wheeler, Chief Lecturer, U. S. Forest Service, at the West Virginia Commercial Forestry Conference.

a real monetary value. It also destroys the game. Such small animals as rabbits and squirrels, and fur-bearing animals such as coons and foxes, are burned. Even big animals, such as bear and deer, if not actually killed, are crippled—their feet being burned and injured so that they cannot forage for food. During the summer of 1929, hundreds of deer and other big-game animals were burned to death in our western forests. Even the birds do not escape. They are smothered and fall to the ground where they are burned, and nestlings are frequently burned up with the nests. Hundreds of instances could be cited to prove this point.

Up to the present time a nation-wide program of forestry has not been perfected, and such a program must depend upon the action of the various states. What West Virginia and other states will do with areas good only for growing trees is of the greatest importance in the development of such a program.

Some reforestation work is being done throughout the country. Thirty-three states—among them West Virginia—have state nurseries which furnish trees at the cost of production to farmers and timberland owners.

It pays to plant trees. A very notable example is at York, Pennsylvania, where the water company bought up farm land about the reservoir which furnishes water for the city of York, and planted it in trees. The result of this plantation is that the water supply for

the city during dry periods is twice in volume what it was before the plantation was made, and except for about two weeks in the spring of the year, no silt washes into the reservoir as it formerly did with every freshet.

Of course the greatest object in planting trees is the actual yield of wood and other forest products. A farmer in Paoli County in Indiana was offered \$1500 for three black walnut trees. Of course the average black walnut tree is not so large and may not have curly wood in the root and may be in an isolated place; so the average price for mature black walnut trees is from \$25 to \$50 each, or from \$50 to \$150 per thousand feet board measure, on the stump. Other hardwood trees are

valuable, and so are the soft wood. In West Virginia there is not a great need for replanting if seed trees are left when the timber is cut, and if fire is kept out.

Trees have a real value in beautifying the



Lure of the Forest

roadside and the city street or the landscape in general. In the latter case they attract tourists, who enjoy traveling through beautiful country and camping by the roadside or in the public camp ground. Last year there were more than twenty million tourists in the national forests of the United States, and there were millions more in the state forests. When West Virginia has more state forests and city forests with camping facilities, the tourist business will increase by the hundred fold, as has been the case in every other state where state forests have been created and have been open to visitors.

The state forest, besides producing lumber, furnishing camping grounds, and regulating the water flow, protects the game. The State Game, Fish and Forestry Commission is creating game refuges. Experiments in other states, notably Pennsylvania, New York, that increase of game can be brought about and some of the western states, have shown to any great extent only where there are game refuges. For the best results it is necessary that the greater bulk of the game refuges should be on state or federal land, and it is always essential that there be forests to furnish cover and food for the game. It is very important that there be a wholesome respect for the game laws; otherwise a successful game program can not be put over.

There are many natural beauty spots in

West Virginia whose beauty is enhanced by forest growth. Citizens of the state and many from the outside are attracted more and more to these beauty spots. As time goes on and the forest areas are made more accessible and beautified, particularly by the keeping out of fire, the tourist business will become a very great asset to the state. The money spent by these visitors will contribute to the up-building of industries of the state. Not only will there be transient tourists but there will be more permanent camps for boys and girls.

West Virginia has made a most admirable start in its forest program. The state has some admirable forest laws, notably the one requiring every person owning 360 acres or more of timberland to pay one per cent towards protecting his area from fire, the state and the federal government putting up the rest of the money required for that purpose. The forest officials of the state are thoroughly in earnest in their work, believing they are rendering a real service to the state.

As stated in the beginning, forestry is a question of land use. Use land for growing timber for the value of the timber itself, for watershed protection which includes the prevention of erosion, for protection of game, for the beautification of the countryside, and for recreation. West Virginia has millions of such opportunities on its millions of idle acres suitable only for tree growth.

THE EDUCATED MINISTER IN THE MOUNTAINS

WARREN H. WILSON

The older denominations educated their ministers, and from them have gone into the Southern Appalachian and Cumberland Mountains during the past fifty years pastors, women workers who are doing the work of pastors, and settlement workers supported independently of the churches. These all share the inheritance of standards and ideals, of methods of thinking, of the older education. They have scientific convictions and are attentive to the teachings of contemporary science; they

welcome research and the publication of new discoveries as well as new theories in the fields of history, in the concerns of mankind, and in the physical universe.

They have certain standards, also, of personal morality. They respect human life; they are temperate, sober, and law-abiding; they have both national feeling and a sympathy that is international.

They have convictions as to justice in industry; they believe in the working

man as much as they believe in the capitalist; they respect the land-owner and naturally regard the development of farm tenancy or landlordism as a sign of the break-down of society. Finally, they have longings for the worship of God; they feel that religion is something more than the saving of souls or the acquirement of religious comfort by individuals.

The home churches from which these religious and social workers have come have been, for over a century, evangelistic in a degree; so such workers have easily conformed to the mountain program of preaching and soul-winning. But they discover that this conformity of theirs to mountain character tends to eliminate their own churches. They feel their religion is thinned down to the dilution of the mountain mind, and this fact touches them with discontent.

Their home churches are disposed to promote social welfare and to care for poor persons; hence, in not a few instances, they have become mere welfare agencies in the mountains. Today the churches from which they came forth are going deliberately in the direction of a more liturgical worship; they are erecting new edifices suited better to reverence for God than to hearing the voice of man. So the gap widens between the educated minister, or the child of a church which has standards of education, and the people about him in the mountains.

Certain restrictions are closing in upon the social settlement and the mission stations of the church "fetched on" by "furriners." In the first place, it is silenced as to scientific teaching. This is done very gently and very effectively. The minister, who has himself graduated from a good scientific or classical college in which modern theory as to biology is taught as a matter of course, observes that to teach these things in the mountains would awaken a protest which he thinks it is discreet to avoid. No one forbids him; in fact the power of the silent, gentle protest on the part of the people whom he has come to love in the mountain valley is more potent than a resolution by a ministerial association or the denunciatory sermon of a Holiness preacher.

Then the college graduates who now serve in the mountains are forbidden to organize recreation freely as they would organize it in a college town. The happy and joyous play into which they would enter cheerfully at home meets an austere refusal. The young people in the mountains would gladly take part in play exercises, but mountain society is rigidly socialized. Therefore the moral tonic of recreation cannot be applied in most mountain communities where educated ministers have come to live, as it would be applied in the Y.M.C.A., or Y.W.C.A.

And now business is invading the mountains. Mining and mill towns are filled with the migrant families who came from the lonely coves and from worn-out lands. These mining and mill towns are governed autocratically; there is no discussion in them of industrial justice. In one of these towns it would be impossible to discuss, with academic freedom or with practical purpose, the living wage, or the standard wage, or the right to strike, or the right of a working man in his job; probably a lecture on the cotton mills of New England, or on the history of the industrial revolution, would be impossible in one of these mill towns. These are very positive obstacles to the unlimbering of Protestant Christian thought. On these sides of him the educated minister or woman worker finds high walls forbidding him to think and speak, restraining him from access to the moral improvement of the young, and blocking the way he would take toward industrial justice.

There is also a diplomatic pressure exerted by mountain preachers which is more powerful than our ministers will usually admit. The educated minister holds himself bound to avoid controversy. He is therefore complacent and polite to the mountain preacher, who has very little education. So far as may be, he partakes of the parsimonious rations doled out in the brush-arbor. It is true that the courtesy he shows is not usually extended to him, but it is the custom of educated ministers to treat other ministers of religion with consideration. This gives a diplomatic power to the mountain preacher that in fact cancels the

very usefulness for which the educated minister from college and the seminary came thither. Religion is made by this diplomatic process a humanist concern: its ends are in human excitement and human comfort. But the man whose eyes are open, because he has read the great books, finds religion only in his service of God.

It seems to me that these obstacles to service by educated men in the mountains will remain, and the effect of them will be to discourage a good many men who would gladly serve in the mountains if only they could serve freely as they would in a town of the East or the Middle West.

Certain readjustments would seem to be necessary if we are going to encourage educated men and women to live in the mountains. Of course, no adjustment is needed for those who are willing to do only social work, helping individuals, lifting lame dogs over stiles, enabling children to be educated—probably a great many workers will continue to do no more than these helpful acts to persons. So far as a religion of evangelism is concerned, it can be entrusted to the mountain preachers themselves, who do it well. But there ought to be churches in the mountains in which God rather than man is in the mind of the preacher and of the people. We should have a few churches in which order, silence, beauty prevail. We should have something besides meeting houses. We should see the house of God beautifully kept, reverently maintained; open only and open often for worship, for the experience of awe and reverence, and for paying those tributes to God which, being impossible in themselves, yet require a token and a symbol, in order that the soul may live and continue in the things of the spirit.

We need also schools which will not serve business directly or prepare for vocations in any deliberate way, but will teach the student how to think. Unfortunately many of the mountain schools which might have taken these courses have merged with the public school, and the public school belongs to the politicians and the business men. It makes

citizens for the states and employees for industry; it does not teach the bright and eager mind to think, to weigh, and to discriminate. We need some schools of this sort to teach men to think. They ought not to be colleges with a long and labored course in which the raw mountain boy is dried in the kiln and seasoned for the outer world; these schools ought to be in session not over a year, preferably not more than six months, during which the waking imagination will come into contact with great books. I do not know how many we are to need—the market for them at present is small—but I am attempting to say what conditions we must meet if educated and thinking people are to live and serve in the mountains.

After these fifty years we know more than we did at the beginning. The mountaineer is not an individualist as has been supposed. He is socialized. He is enslaved to a society that dictates to him with ruthless severity what he shall not think, what he shall not say, and what he shall not do. It idealizes the parsimonious and meager mental diet which was possible in a pinched and local social order. This order is already shattered, but the instinct of its leaders is to maintain its hard rule in the easier, more fluid days that have come. For this great change, if the mountain society is to be preserved in a new phase, there are needed native mountaineers who think and discriminate, who can weigh and appraise the elements of society. There is no teacher wise enough to dictate the thoughts for them. It is very helpful for the purpose that the public schools are mobilizing the mountain children and setting them on the high roads with ability to read and write. But there must be among the sons and daughters of mountain families a few who will know the great thoughts and value the great moral imperatives of life: sacred regard for human life, respect for property, the beauty of temperance and sobriety, the industrial virtues of honor and truth and credit, and a tolerant respect for people of other nations.

It seems to me that our duty in the mountains is to preserve the society, not to destroy it. We are there to save individuals, and in

this are at one with the mountain preachers. But the educated minister who goes into the mountains, moved by the beauty and touched by the affection for locality among mountaineers, will desire to preserve the society of the mountain valley, and make it like unto the historic mountain cultures from which have gone down into the world the rule of peace and intelligence, and of austere but adaptable morality.

If I may suggest a kind of school, it would be an adventure in Adult Education. I would call it a School of Hobbies. In it the ministers and those who could help him would assist men of the community to do what they want, or to make what they want. Some might want to learn to read, some might want to learn to write, others might want to whittle or to tinker. If a minister resident in the country would open a shop for this purpose of enjoying hobbies, I think he could easily get the funds for it from his friends, and it would be a center of the life of the men of the community.

The answer is that not every man could do this. I grant it. But in reply I say that this is only one type of school that I would suggest. I think a Hobby School would do much to awaken the minds of the people, for it would be a school of the older boys and the grown men.

I admit that as time passes I am more interested in worship than I am in education. This is to confess what is merely a personal bent or inclination. It is not to assert that worship is more important than education to anyone else than myself, and I am not saying that worship is going to serve any purpose whatever. I think the effects of worship are beyond human control, so that one ought not to worship God for any ulterior purpose. It is an end in itself; but its effects flow out from the fact that worship is a kind of death and immortality of the soul. It is forgetting one's self in God, and that is what the people in the country need to do. They need to be put to death that they may rise again. What

they will be after they wake up nobody can know. "There is need of a good many healthy funerals," as it is often admitted in a community. Worship is the way to put people to death and to get them back again.

Mountain worship should be rugged and simple, not necessarily ornate. Many of the Reformed and Congregational churches are regulating their worship with austerity and simplicity, and a few of them are flowering out in the ornamental worship of the Episcopal churches. The question of the form of worship is to be decided by the taste and by the success of the individual person. I am not making any suggestion save that there are at least three ways to worship God, and only one of them is the ornamental way. My own belief is that country people will do better to worship God in an austere way or in silence.

But the beginning of worship is to clean up the churchyard, paint the building, mend the steps, hang the door, and put glass in the windows. Many of our country churches are not fit to keep cattle in—naturally their presence in the community disinclines men to worship God.

After he has cleaned up the church and put the house of God in conspicuous good order, in far better order than those of the people who live in the community, and after he has astonished the neighbors by playing doorkeeper in the house of the Lord, the minister can then lead them in orderly worship. The first thing to do is to abolish a great many of the hymns that are sung in the country. We do not need so much singing. Better none than the sentimental animalism and the shrewd commercialism which are celebrated in many of the hymns that are cheaply printed. On the other hand, Bishop Moore of the Southern Methodist Church has a little hymnbook which is suitable for worship anywhere—and is as cheap as the most.

Churches that worship, in the mountains and in the country generally, will have to be content with few to attend them. But those that do worship are content with few; so this is no sacrifice. It is a good time to begin to

devote the church to God and take it way from the uses of man.

These are only suggestions. I marvel at the devotion of educated ministers in the mountains. I know well their disappointment, and I wonder at their continuing—their pastorates are long among the mountain people. Often the

ministers have made too great sacrifices for the privilege of being heard. I would propose that the educated minister make no sacrifices and no compromises, but that he go on from year to year, as a scholar and a worshiper seeking his own satisfactions, especially the approval of his own community as a teacher and as a minister of Most High God.

A PATCH OF CORN

MAY JUSTUS

Cynthia hated Ryal one day out of the year—the day on which he chose to plant the patch of corn before the door. It had been the yard the first year after their marriage and Cynthia had gloried in the rock bordered beds of bachelor buttons, pretty-by-nights and a dozen other bright annuals. Her yard then had had the admiration and been the envy of every woman up and down Bear Creek and the joy of her own life.

Year by year for six years now the little lot allowed her for flowers had dwindled and dwindled before the marching ranks of corn until only a single narrow border of blossoms ran around the house like a troop in gallant retreat.

Cynthia hated the corn. From the time the earliest spear thrust itself above ground until the last withered stalk was felled by the hoe, she felt for it much the same hate she felt for Ryal the day he planted it. It seemed that the two, Ryal and his corn, were leagued together against her to destroy the one little bit of beauty in her life. Ryal could not understand.

"What's flowers?" he would ask with contempt. "Ye cain't eat 'em an' ye cain't wear 'em. What ye want 'em fer?" And Cynthia, unable to explain to his satisfaction, would sit on the step and cry while he laid off the furrows which later, she must follow with a hoe. And this was the hardest part of it all, for she felt as she worked, a little sense of treason to her own soul.

Defiance would have done no good. When Ryal looked down from his six and a quarter

feet of height and laughed at her, she knew that he felt she was too little to curse as he did everything and everybody else. A mighty man was Ryal, in his way, and he brooked no obstructions. Cynthia followed when she must and escaped when she could.

Ryal had his better moments when he seemed fond of her and let her have her way. At one such time he had promised this year she could "plant all the blamed flowers she had a mind to."

Cynthia's feet had seemed winged that day as she sped up the path to the mission cottage. Miss Turner must know the glad news that at last she was to have a garden. Her gray eyes had lighted up as Cynthia, glad and happy as a child, had told her what Ryal had promised.

"I'm so glad, so glad! Cynthia," the missionary had said over and over.

It was a refuge—that little white mission cottage—set high on a spur of Old Blue Mountain. For Cynthia, it was not unlike the pillar of cloud and fire that guided the Israelites of old. When the corn grew up obstructing every other view but the mountain, it stood there for her, unchanging, always waiting. Ryal had objected to its being built there and he had objected to Miss Turner—"A fool, quare woman livin' by herself." Once he had forbidden Cynthia going there and she had obeyed him for two months. Then one night Ryal had been sick—sicker than he had ever been before. He had thought he was going to die.

* Miss Justus has kindly let us print this charming story written five years ago for the *Woman's Viewpoint*

"Go atter that woman—she docters sick folks," he had said at last. And afterwards Cynthia might go when she pleased.

She pleased to go often. It was such a pretty place. The floors of the mission cottage were smooth and shiny and here and there were rugs of soft texture and deep lovely colors—very unlike the home-made ones that Aunt Mollie Lucas wove of rags in hit-or-miss fashion. The walls were so bright the flowers on them seemed to be blooming. Cynthia had cut pictures from the seed catalogues and pasted them over her newspapered wall at home but the effect did not please her.

There were lovely pictures too. One she liked best—a mother with a baby in her arms. She had looked at it so much that Miss Turner had given her a copy of the picture cut from a magazine. It was tacked over the fireplace now. And there were books—such a number. Cynthia thought there must be a hundred or more. Such entrancing covers of red and blue and gold! And such fine tales within! Cynthia had gone to school and she could read very well indeed. So happily and recklessly did she go adventuring through the realm of fiction that she often lost herself and was not a little surprised sometimes to find herself sitting on her own door-step. There was joy and pain in such experiences and Cynthia's soul was waking to wonder.

Behind the mission cottage there was a big yard—a garden, Miss Turner called it—with flowers the like of which Cynthia had never seen before and with names that she could never remember.

"You'll learn them well enough when you have them for your own," Miss Turner had told her. It was as good as a promise.

Cynthia saved pennies from the egg money and ordered seed catalogues which cost nothing but a penny postal. Over these she spent long dreamy hours, marking here and there with a little lead penciled cross of hope some extra fine specimen.

Ryal despised the catalogues as so many artistic lies gotten out for the sole purpose of winning good money from foolish people. If Cynthia, in the excitement of a new discovery

ventured to share it with him, he would narrow his eyes and twist his mouth in a queer smile.

"Do you believe that?" he would ask.

Cynthia was ready to believe anything that promised beauty and her faith grew with the passing days. Spring was coming again on old Bear Creek. The willows were softly green along the water and here and there a red bud painted fresh warm color on the rugged slopes.

One day Miss Turner brought Cynthia a purple hyacinth in a little pot and the girl in grateful joy showed her half a dozen packets of flower seed that had come in that morning's mail. Miss Turner looked and listened with understanding in her face.

"We'll be exchanging things next year," she said.

"I'd like that," the other said. "I've never had anything of my own to give away—never a thing. And I'd like to."

That afternoon Cynthia, while wiping the dinner dishes, heard a sound that made her drop the things she held and hurry to the opening that served as a window. In the far corner of the yard stood old Kate hitched to the plow upon which Ryal was tinkering. Cynthia hurried out.

"Ryal!" she called, a note of fear trembling in her voice. Ryal looked up with impatient interrogation.

"Ryal," she went on, "ye ain't goin' to plow the yard air ye?"

"Don't ye begin pesterin' me now, Cynthia," he replied. "I'm too busy to listen to any o' yer foolishness."

"But ye said ye wouldn't plow it this year, Ryal—ye know ye said ye wouldn't. Ye said I could plant flowers—"

"Plum foolishness, like all the rest of yer notions. Ye eat corn. Ye don't make bread out o' flowers, do ye?" And he laughed scornfully.

Cynthia's blue eyes filled with tears and she fled to the house.

"Tain't no use," she sobbed to herself over the dishes. "Tain't no use for me to try to have nothin' or to hope for nothin'."

Later on in the afternoon Ryal came in and taking a string of seed corn from the wall,

began nubbing it. Cynthia came over and taking the ears shelled them into her apron as Ryal selected those he wanted.

"I got to go to Stamper's to git that plow fixed," he said after some time. "Atter ye finish shellin' this, ye better put it to soak. We'll plant the patch in the mornin'."

"Well," said Cynthia.

When she was ready to put the corn to soak, there was, she found, no water in the bucket. The water in the teakettle might be cold. She examined it and found it nearly boiling. It would kill the corn. It would *kill* the corn! A certain sense of fearful exultation thrilled her. Dare she do it? Dare she risk it? Some impulse within her, more fearful of hesitation than of possible ultimate discovery, made her lift the kettle. A moment later it clinked with an empty sound upon the hearth stone, and Cynthia, with flushed face and curiously shining eyes, went racing down the path to the spring.

She had done it! Whatever happened, she had done it, and no terrifying consequences could rob her of the joy she felt in doing for the first time in all these years just the thing she wanted to do. Ryal might plow and she might plant but the corn patch before the door would not grow this year.

It would be too late for Ryal to plant again and—she might have flowers after all. It would not be too late for some kinds, and she could water them in dry weather. She would ask Miss Turner.

As the thought of the missionary crossed her mind, a most disturbing doubt arose. She had acquainted Miss Turner with some of Ryal's ways and had found her sympathetic, but she could not quite imagine her view of this action and she decided to keep it to herself.

The next morning they planted the patch. Ryal laid off the furrows and Cynthia dropped and covered the corn.

"Kiver it keerful, now," Ryal cautioned. "Ye don't allus git it deep enough."

"All right," said Cynthia, and she smiled beneath her blue sunbonnet.

That night for supper she fixed corn cakes and Ryal ate a dozen in wondering satisfaction.

Cynthia, he felt sure, had been mad at him about the corn patch, but the corn cakes were contrary evidence.

The next day one of Cynthia's young brothers rode over from Middle Creek to say that her mother was ailing and wanted Cynthia to come over for a spell. Cynthia waited for Ryal to speak.

"I reckon ye might as well go now as any time," he said at last. "Ye been wantin' to go fer a long time and it'll be two weeks afore corn is ready to hoe."

So Cynthia went and stayed the allotted time. Every day she thought of the corn and wondered if Ryal would re-plant before she got back. It was getting late to plant corn. On the day that she was to return home, she found her mother out in the yard digging roots and sprouts.

"I'm gettin' these here fer yer own yard," she explained. "This laylock wus set out by my granny when she moved from Ole Miss'ippi. This rose is one yer pap got from his mammy's grave over in Wolfe County."

As she went on digging and talking about flowers, Cynthia was thinking just where she would set each one of them. She forgot the patch of corn. She saw only the yard of her dreams; a yard like this old one of her childhood, full to overflowing with shrubs and vines of precious memory. Then she remembered.

"Mammy," she said, after an interval of silent digging, "Mammy, if ye never had no yard to plant flowers, whe'd ye reckon ye'd plant 'em?" The old woman looked up and across the narrow valley to a clearing on a high hill.

"Reckon I'd put 'em at the graveyard," she said with uncommon gentleness in her voice. "Hit's plum purty up there."

"But, Mammy, I hain't got no graveyard." She had spoken almost without knowing what she said.

"Graveyard! Lord-a-massy, child, no! Ye got to raise a family fust afore ye git a graveyard." The old woman laughed and looked somewhat searchingly into her daughter's face which now flamed into a lovely rose.

"Cynthia, ye reckon—," she began gently.

"Maybe, Mammy." The other's lips barely moved and her eyes were on the ground.

"Hain't a one o' them blamed hills o' corn come up," said Ryal, the morning after her return home. "'Tain't the ground mice got the seed bekase I've scratched it up to see. I been thinkin' that maybe hit was planted in the wrong sign. You git the almanac and see." Cynthia looked the matter up.

"The sign was in the feet," she said.

"'Tain't the signs then. Pap allus planted his'n when the sign was in the feet,—'tain't that."

Cynthia rejoiced, but her hopes fell when Ryal announced his intention to replant the whole patch.

"Ain't it late to plant corn, Ryal?" she asked.

"Yeah, it's late," he agreed. "But it'll make roastin' years, I reckon."

And there was nothing for Cynthia to say. She thought of what she would have liked to say. She dreamed every night of destroying the corn. Sometimes she pulled it up with eager hands; sometimes she cut it down with a vengeful hoe. She became more silent than usual and when Ryal looked at her curiously and asked if she were ailing, she shook her head and murmured, "No."

The house remained unswept for days and the bed was untidily spread. It had been a long time since she had made any corn cakes. Her food was burned or raw; under-seasoned or not seasoned at all. Ryal swore at her at first, but even his rough curses savored of uneasiness. He ceased asking her to go to the fields to work and when she made up the little cot in the corner for herself one night, he made no protest.

Miss Turner, missing her frequent visits up the mountain, came one day with a new book and a new flower and asked about the flower garden.

"They ain't no flower garden," Cynthia replied, and she stopped as if something choked her. The high waters of her soul stopped for a moment against the barrier of shy reserve—but only for a moment. The flood broke through at last in a rush of tears and sobs and wild

reckless words.

"He's mean—he's dog mean! He does hit to hurt me! He never needed the patch of corn. Hit was jest bekase I hankered atter it so. He knowed hit an'—he tuck hit away from me. I hate him!" she cried hysterically. "I hate him!"

Miss Turner tried to speak, to touch the other with a soothing hand, but Cynthia rocked herself back and forth and would hear no word, feel no touch.

"I'm a'goin' home to mammy and die," she sobbed. "They's flowers in the graveyard." Miss Turner's eyes filled but she grasped Cynthia's arm and shook her—not gently or worriedly but forcefully, almost roughly.

"Stop it!" she commanded. "Stop it, Cynthia." Cynthia gasped and swallowed.

"I'd like to know why," she said. "I'd like to know why."

The missionary's eyes were very kind.

"Stop crying," she said, "and I'll tell you."

It was a few days afterwards that Ryal came suddenly upon Cynthia as she was sewing. In confusion she started to her feet and some bits of white cloth floated to the floor where lay a large ragdoll. Ryal paused, his hands uplifted to the sides of the door, his eyes bewildered. He transferred the tobacco with a dexterous twist of his tongue from one side of his jaw to the other. And still he did not speak. Cynthia could not have spoken to save her. She had supposed him to be plowing a half a mile away. Then he had turned away as suddenly as he had appeared and with a deep breath of relief, she picked up the scattered things from the floor.

That night she missed the butcher knife when she went to get supper. She asked Ryal about it. His only reply was, "Search me!" The next day the scissors disappeared and long search did not reveal them. Once she went to the shelf where they kept several kinds of medicine and found that most of it had been removed. Then she was sure of Ryal's guilt.

He's a doin' hit to plague me, she thought, and began to hide things herself—such things as she thought he might take—her clothes and the flower catalogue, and a few little things

Miss Turner had given her. She found Ryal's gaze bent upon her at many unexpected times. He seemed to be watching her every minute and he gave her silence for silence until there were scarcely a dozen words passed between them during a day.

One afternoon he rode over to Tallega, the nearest railroad station, to get some fertilizer. When he was out of sight, Cynthia left the house and walked outside, glad to feel free from Ryal's eyes and his presence.

The corn patch was growing. The little green banners waved gently, hopefully, but Cynthia bent upon them a look that might have been for the flag of an enemy. At sight of the sickly row of little flower plants running around the house, she could have cried. Those in the back yard had looked better until the lye from the ash hopper had overflowed and killed them. She hadn't thought it might do that and besides there wasn't any other place for flowers—no place for anything but corn.

Flowers were easily killed. Corn grew in spite of everything. She wondered if anything would kill corn—if lye would. It might if there was enough. She looked at the big tin can that Ryal had got from the storekeeper, full of lye strong and brown. She looked at the little green banners of the corn. She could—she could and she would do it—not all today. There wasn't enough lye. A few rows now—a few another time. She would do it and pay Ryal back for all the plaguing mean things he had done.

Dipping a bucket full, she started out, passing from hill to hill, giving each a cup of the strange drink and to the hardier looking stalks, two cups. The lye soon gave out and she went back for more. Her back ached and her head swam dizzily as she worked hurriedly, never pausing to look up. It might be too late to plant flowers—it wasn't too late to kill corn. She thought of the patch as it might have been—rows of red and blue and yellow flowers. She had ordered the brightest ones—blue and yellow and red—she could see the colors. And then they all mingled and turned to a sudden black.

When next she knew anything, she was in bed and somebody's—Miss Turner's—hands were tying a cold wet cloth about her forehead.

"Give her these,—one every half hour." It was old Dr. Gibson. "And keep her quiet. Better stay here awhile yourself. I've got ten miles ahead of me before dark. Lucky I had to bring that medicine to you this afternoon."

There was a startled exclamation at the door—an oath that ended in a half articulate cry.

"My God, Doc! what you doin' here? Is Cynthia dead?"

"Pretty nigh it, Ryal, pretty nigh it. And no wonder, working out in that corn. Can't you let up on her a little at a time like this? I feel like cussin' a blue streak every time I see a woman slaving away for some damn fool of a man,—excuse me, Miss Turner, but I'm a mountain man myself."

"Doc,—” rumbled Ryal.

"Don't you 'Doc' me," the old man growled. "You listen to me. I brought you and Cynthia both into the world and I reckon I've got the right to save her if I can. Miss Turner here is about as good a doctor as I am, and she is going to watch over Cynthia and send for me when the time comes."

There was a long silence, then Ryal—she knew it was Ryal—brought his fist down on the table.

"Doc, ain't Cynthia crazy?"

"Crazy. Good Lord, I reckon you are!"

"Doc, I been thinkin' hit nigh on to a month. She's been a acfin' quare 'bout that long—playin' with rag dolls an' lettin' the house work go, an' cookin' till I couldn't eat hit. I got scared and hid everything she could hurt herself with."

"You're talking too loud. Miss Turner has told me enough that I understand. Come on out and I'll see if I can make you see daylight with the sun up."

When their steps crossed the door sill, Cynthia opened her eyes and Miss Turner smiled down into them.

"Go to sleep," she said.

The next morning Miss Turner made Cynthia comfortable in a chair near the door and went home to get some things she needed. Ryal came into view wielding a hoe, but if he was hoeing, it was certainly in a very peculiar

fashion. He seemed to be leveling the ground with long even strokes. Here and there Cynthia was sure he cut down a hill of corn. Opposite the door he looked up and seeing her, cleared his throat two or three times.

"Mission woman's gone up atter some flower seeds," he said. "Said hit mought not be too late

for some kinds yit." Then he paused and wiped his forehead with his sleeve.

"The corn?" faltered Cynthia. "The corn—"

Ryal hit a rock with his hoe. Three more steps and he paused again.

"This'll make a mighty purty place fer a little feller to play in," he said without looking up.

FACTORS AFFECTING FARM INCOME

J. D. POPE

For the past two years the Alabama College of Agriculture at Auburn has been making a study of factors affecting farm income on about one hundred farms in Marshall and DeKalb counties in what is known as the Sand Mountain region of Alabama, located in the Appalachian Plateau. The study has thrown some light on the returns from farming in this area and has helped to answer the question as to why some farms pay better than others. Professor C. G. Garman of the Department of Agricultural Economics has done a major portion of the field work and analysis of this project.

In 1927 the average labor income per farm on 92 farms was \$344; in 1928 the labor income on 119 farms was \$391. The labor income figure is computed by subtracting from gross receipts, all expenses, including both the value of labor supplied by the members of the family other than the operator and the interest on the investment. Labor income is used in this study as the most satisfactory means of comparing the relative efficiency of different farmers.

Among the factors which have been found important in influencing the income of these farms are, in order of importance, average yield of lint cotton per acre, acres of cotton on the farm, receipts from outside sources such as work off the farm, and receipts from poultry and poultry products.

In 1927, 32 farms which averaged 257 pounds of lint cotton per acre had an average labor income of \$83, fifty farms which averaged

349 pounds per acre made an average labor income of \$356, and 10 farms which averaged 450 pounds per acre made an average labor income of \$1119. The data of 1928 showed the same tendency for income to increase as yield of cotton increased. On the average, an increase in the yield of cotton of one pound of lint per acre increased the labor income \$2.50.

It is also interesting to note that those farms which had the largest number of acres of cotton per farm made the larger incomes. In 1928, farms averaging 9 acres of cotton had a labor income of \$206, those averaging 17 acres of cotton had a labor income of \$269, and those averaging 33 acres had a labor income of \$615.

We were surprised to find that about one-half of these farms had outside sources of income, such as work off the farm, at saw mills or cotton gins, and hauling wood. Many of these farmers were able to increase their income very materially by doing such outside work at times of the year when other farm work was not pressing.

This region is not a livestock country in the usual sense, but some of the farms do have poultry flocks averaging 100 or more hens per flock. These farmers were able to realize a net return of about \$1.00 per hen. It is interesting to note that those farms which had the largest receipts from poultry and poultry products had larger labor incomes than those who had smaller receipts from poultry and poultry products. For example, those whose gross receipts from poultry and poultry products averaged about \$20 had labor incomes of \$312,

those whose poultry receipts averaged \$103 had an average labor income of \$388, and those with poultry receipts of \$694 had a labor income of \$507. About one-half of the labor on these flocks was performed by the operator, and about one-half by the operator's wife and children.

Another interesting feature of the study was that those farmers who use two-horse cultivators were able to reduce the hours of labor required in the production of an acre of cotton from 72 to 53 hours. It is interesting to note that even the hand work of chopping and hoeing was reduced from 33 hours per acre to 23 hours per acre. The amount of family labor in the crop was reduced very materially where the two-horse cultivator was used, and incidentally these people kept more poultry. These facts suggest that the use of labor saving machinery such as the two-horse implements will reduce the amount of family labor re-

quired in cotton production and provide more time for the keeping of poultry.

This is an area of white farmers exclusively. In general the farmers and their families do all of their own work and the farms present a thrifty appearance, the houses being painted. The soil in this region is productive and quite responsive to fertilizer. It is one of the best kinds of soil in Alabama for the production of cotton as well as many other crops. The country is comparatively free from boll weevil, and in recent years it appears that the farmers have been making progress toward a stable prosperity. Land values are high and the size of farms has decreased in the last few decades. The greatest opportunities for increasing living standards would seem to be to increase income by using more fertilizer to obtain larger yields of cotton per acre, by using labor-saving machinery, and by conducting supplementary enterprises.

A LETTER

To: The Editor of Mountain Life and Work—

In one of the recent issues of *Mountain Life and Work* you asked that any one who knew of some especially beautiful thing among the mountain folk of Kentucky would report the same to you.

I wish, here and now, to acknowledge the rare hospitality with which I, a complete stranger, was received last June in the homes of the dwellers in some of the more remote creeks in the so-called "backward counties" of the state. My companion was a woman who had worked for twenty-five years along social lines in other counties but she was personally known to only two individuals in this region. Her mission was to select a site for a special work among children, and a statement of this purpose served as her introduction, but of me they knew nothing, and it was with amazement that I observed the gentle courtesy and quiet cordiality with which they received us both,

asking not questions, but placing at our disposal the best they had to offer. For this, upon our departure, they would accept no recompense, but smilingly asked us to come back again when we could.

The perfect ease without embarrassment, the absence of any appearance of disturbance in their routine, and above all the admirable behavior of the children and their attitude toward their parents betrayed an innate breeding which must be accredited to the good stock from which they sprung. It gave me, a northerner by birth and city bred, much food for thought and forced me to comparisons with some of our own manners not entirely favorable to the latter.

I came away feeling that there is a great hope for the future in the men and women who shall come out of these mountain fastnesses to take their places in the great world. And I am glad to be able to make this public acknowledgement of their kindness to me.

Dr. Grace E. Cross

VEGETABLE DYES

HELEN WILMER STONE

In almost all American families we find treasures of the past that are carefully handed down from generation to generation, and the one that is treasured above all others is the handwoven coverlet with its lovely delicate colors mellowed by time. What a history there is in these colors! In those bygone days you could not go into the store and from a color card pick out just the dye you wanted. The coloring and weaving by hand of these old coverlets was no small task. And perhaps because it was such a slow tedious task is the reason why these treasures are so lasting and dear to our hearts.

Nowadays our interest seems to have turned again to handmade things. You see more looms in homes; interest is taken in reproducing the intricate patterns. And it seems more fitting that the wools that go into the making of these things should be dyed with vegetable dyes, carefully following the recipes of grandmothers, usually handed down by word of mouth. The coverlet of over a hundred years ago, its color still bright, and satisfying our eye for beauty, surely is a guarantee of the lasting qualities of these homely dyes.

Dyeing with vegetable dyes is an art for the individual craftsman, for these dyes cannot be produced wholesale. In modern dye works the wools are dyed in enormous quantities, but this wholesale method is destructive to art and to the individuality of the dyes themselves. So here is an opportunity for the amateur weaver to get his own colors. He can with his own hands gather the roots and barks and flowers from the field and woods, make up the dye himself, and then watch the color grow in the wools.

However, a large number of our vegetable dyes have to be imported. In Colonial days South Carolina was a great producer of indigo, but now, except for a bit grown at the Experimental Farm in Washington, there is none in cultivation in the United States. It must all be imported from India or China. Also, in the old days there was always the madder plant in the flower garden, but now madder is imported

from Belgium. Logwood, fustic, cochineal, cudbear, catsu are imported, but these can easily be bought from dyewood firms and wholesale druggists. Then there are our native dyes that can be had in most places almost for the asking: walnut hulls, roots and bark, sumac berries, hickory bark, onion skins, poke berries; coreopsis, marigolds, the little wild sunflower that grows on our mountain sides, and a host of others.

Of course the next question is, how to use vegetable dyes? To begin with, always dye out of doors if possible. Somehow the air and sunlight will make a difference with your colors. It is best to have two dye-pots, one black iron pot for dark, sober colors, and one of brass or copper for bright ones. You can, at very little expense, erect a tripod of poles and hang your pot from this. Have your water supply near by, and use the water plentifully. "Don't crowd your pot" is an old saying, which means have plenty of water in the pot so that the wool can be moved about easily. A sunny place in which to hang your wool to dry is the next thing to consider, for sunshine is very necessary for getting bright colors.

Most vegetable dyes require what is called a mordant. That is, the wool is first boiled in a chemical solution which prepares the material so that the dye will bite into it. The commonest mordants are alum, bichromate of potash, muriate of tin, and copperas; cream of tartar is also used in conjunction with some of these to help to brighten the colors. After the wool is strongly impregnated with this mordant, put it into the dye-pot and watch the color come—it will come very slowly. A few vegetable dyes, however, do not require a mordant. These are walnut hulls, roots, and bark; sumac berries; and butternut bark. With these the wool can be put directly into the "ooze" or dye.

To get a dye from a plant, put it into the pot and boil until the color begins to come out in the water. When the water is colored and you consider the "ooze" strong enough, put in the mordanted wool; keep moving it about gently

until you get your required color. Perhaps a few directions may be of help. Let us take madder for instance, which is the ground-up stalks of the madder plant. Put a cupful of ground madder into a bowl, cover it well with water, and let soak for several hours. It will swell and you can see the large particles of the roots. Have your bright copper pot scrubbed clean and filled with water; put in the madder and begin to heat it. When it is warm to the hand, put your mordanted wool in. If you want a rose color, have your wool mordanted with alum and cream of tarter; if a flame or brick color is desired, mordant with muriate of tin. When you first put the wool in, it will not change, but as you watch it the color will gradually come. Never let the madder dye boil. The best results are gotten by keeping it just below the boiling point.

Sumac berries give another interesting dye. This does not require a mordant, but can be used directly on the wool. The berries put into an iron pot and boiled will give a lovely soft grey. If "saddened" by a bit of copperas, the wool will turn a steel grey and almost black. Sumac berries put into a copper pot and boiled will give a fawn color. If boiled longer they will give a dark tan.

You will find that with most roots and barks and berries the color will vary ever so little for each month of the year in which they are gathered. For instance, the dye from walnut hulls gathered in September will give a pinkish brown which cannot be gotten any other month of the calendar.

Perhaps the most important dye and the hardest to use is indigo. As in old days, so even yet the blue-pot is set up and used to reduce the indigo so that it can color the wool. This is a tedious process and uncertain, but when the color is successful it is worth all your

efforts and trouble. There is another and easier process, by which the indigo is dissolved in water by the use of sulphuric acid. This is easier to use and gives a great variety of blues—from the palest blue to dark navy blue.

Pine needles and lily-of-the-valley leaves will impart to the wool a soft green that can not be gotten with any other dye. From the old "broom sedge," or sedge grass, that covers our deserted fields and slopes of the mountain sides, comes a most beautiful pale yellow that is practically fadeless. For a deeper yellow we have our old friend the bark of the hickory tree. It is from this bark that most of the yellows in the coverlets of Colonial days were made.

Our flower gardens are also a source of dyes. The coreopsis flower gives a most gorgeous yellow to wool. Save the petals of your crimson poppy and use them in your dye pot. Chrysanthemums can be used, and sunflowers. Wool first dipped in indigo and then into an "ooze" made from marigold blossoms gives a delicate green.

There is a wealth of color in our forests and fields and gardens that we can use in our textiles. And besides what we have knowledge of, there is still more that has not been discovered: it awaits for the amateur dyer and lover of beauty who has the time and patience to experiment to extract yet more beautiful and lasting colors. There is a fascination about these humble home-made dyes that never fails to appeal to a lover of nature. The walnut tree may be cut down and destroyed, but the warm brown extracted from the juice of its bark will live forever in our weaving. The dye flower lasts only a summer, but its glorious orange and yellow will last to delight our eyes through many seasons.